Claims:

1

2   1.   A computer implemented system for testing one or more skills associated with the

3   reading skills of an individual, comprising:

4   a portable media disk storing instructions for one or more tests for determining

5   deficiencies in one or more reading and pre-reading skills and for a scorer for determining a

6   score for each test;

7   a teacher station into which the portable media is inserted wherein the teacher station

8   executes the instructions on the portable media to test one or more skills; and

9   a student computer comprising means for displaying at least one of a graphical image and

10   audio associated with each test based on the instructions on the portable media, means for

11   receiving a user response to one of the graphical images and audio presented by each test and

12   means for communicating the responses for each test back to the teacher station.

13   2.   The system of Claim 1, wherein the teacher station further comprises a

14   recommender for recommending, based on the scores of the one or more tests, one or more

15   training modules for improving a reading or pre-reading skill of the individual as indicated by

16   the score of the tests.

1   3.   The system of Claim 1, wherein the teacher station further comprises a

2   questionnaire having one or more questions for eliciting information about risk factors associated

3   with language-based learning disabilities.

1   4.   The system of Claim 3, wherein the information comprises historical data about

2   reading-related risk factors including one or more of medical conditions including chronic otitis

3   media, family history data including history of dyslexia, environmental data including

4   socioeconomic status and exposure to literacy at home and observational data about an

5   individual's behaviors reflecting competencies in speech sound awareness.

1   5.   The system of Claim 1, wherein the user input device of the one or more client

2   computers comprise a speech recognition device for receiving a verbal response from the user to

3   the one or more tests.

1   6.   The system of Claim 1, wherein the one or more tests comprise a rhyme

2   recognition test for testing the ability to recognize rhymes, a rhyme generation test for testing the

3   ability to generate rhymes, a beginning and ending sound recognizer for testing the ability to

4   recognize the beginning and ending sounds of a word, a word decoder test for testing the ability

5   to read by sounding out a written word, a sound blender test for testing the ability to blend sound

6   units together to form words, a sound segmenting test for testing the ability to segment a sound

7   unit into smaller sound units, a sound manipulator test for testing the ability to manipulate sound

8   units to form a new unit, a sequential verbal recall test for testing the ability to recall a sequence

9   of spoken items, a rapid naming test for testing the ability to rapidly name one or more items, a

10 letter naming and symbol/sound association test for testing the ability to name letters and identify

11 the association between a symbol and an associated sound, and a fluent reader test for testing the

12 ability to read fluently.

1   7.   The system of Claim 1, wherein the tests further comprise a rhyme recognition

2   test further comprising means for providing at least two stimuli to the user and means for

3   receiving user input in response to the at least two stimuli to determine the user's ability to

4   recognize rhyming words.

1   8.   The system of Claim 1, wherein the tests further comprise a test for recognizing

2   the beginning sound of a stimulus, the test comprising means for generating at least one stimulus

3   having at least an initial phoneme and means for receiving a response to the stimulus that

4   indicates an ability of the test taker to recognize the initial phoneme of the stimulus.

1   9.   The system of Claim 1, wherein the tests further comprise a test for recognizing

2   the ending sound of a stimulus, the test comprising means for generating at least one stimulus

3   having at least an ending phoneme and means for receiving a response to the stimulus that

4   indicates an ability of the test taker to recognize the ending phoneme of the stimulus.

1   10.   The system of Claim 1, wherein the tests further comprise a rhyme generation test

2   comprising means for generating a stimulus and means for receiving a response from the user

3   identifying a sound unit that rhymes with the stimulus.

1   11.   The system of Claim 1, wherein the tests further comprise a sound blender test

2   comprising means for generating at least two sound stimuli and means for receiving a user

3   response to the at least two sound stimuli, the response indicating an ability to blend the at least

4   two sound stimuli into a larger sound unit.

1   12.   The system of Claim 1, wherein the tests further comprise a sound segmentation

2   test comprising means for generating at least one stimulus and means for receiving a response to

3   the stimulus comprising means for segmenting the stimulus into smaller units in order to test the

4   ability to segment the stimulus into smaller units.

1   13.   The system of Claim 1, wherein the tests comprise a sound manipulation test

2   comprising means for generating a sound stimulus having one or more sound units and means, in

3   response to the sound stimulus, for manipulating the sound units of the sound stimulus to test the

4   ability to manipulate sound units.

1   14.   The system of Claim 1, wherein the tests further comprise a verbal recall test

2   comprising means for generating at least one sound stimulus and means, in response to the at

3   least one sound stimulus, for receiving a user response indicating the recalling of the at least one

4   sound stimulus.

1   15.   The system of Claim 5 further comprising means for speaking a verbal response

2   into the speech recognition device for receiving a verbal response from the user.

1   16.   The system of Claim 1, wherein the tests further comprise a naming test

2   comprising means for generating at least one visual stimulus and means, in response to the

3   display of the visual stimulus, for speaking the name of or the sound associated with the visual

4   stimulus using the speech recognition device.

1   17.   The system of Claim 1, wherein the tests further comprise a word decoder test

2   comprising means for displaying a visual stimulus to the user and means, in response to the

3   visual stimulus, for receiving a response from the user to determine the ability to read the visual

4   stimulus.

1   18.   The system of Claim 1, wherein the tests further comprise a fluency test

2   comprising means for generating a plurality of visual stimuli and means for receiving a user's

3   response to the visual stimuli within a predetermined time interval to determine the user's ability

4   to read and understand the visual stimuli.

5   19.   The system of Claim 1 wherein the instructions on the portable media further

6   comprises means for motivating the user to complete the tests.

7   20.   The system of Claim 19, wherein the motivation means further comprises means

8   for generating a graphical image and an associated sound to motivate the user to complete the

9   tests.

1   21.   The system of Claim 20, wherein the motivation means further comprises means

2   for generating the graphical image and associated sound after a first predetermined number of

3   tests are completed and means for generating another graphical image and associated sound after

4   a second predetermined number of tests are completed.

5   22.   The system of Claim 21, wherein the generating means further comprises means

6   for generating a graphical image indicating the number of tests remaining to be completed.

7   23.   The system of Claim 21, wherein the motivation means further comprises means

8   for generating the graphical image and associated sound after a third predetermined number of

9   tests.

10   24.   The system of Claim 2, wherein the recommender further comprises means for

11   downloading the recommended training module from the teacher station to the student computer.

12   25.   The system of Claim 2, wherein the recommender further comprises means for

13   storing the incorrect responses to the one or more tests and means for generating a training

14   module recommendation based on the incorrect responses.

15   26.   The system of Claim 25, wherein the recommender further comprises means for

16   comparing each incorrect response to one or more error measures to identify an error associated

17   with each incorrect response and means for generating a training module recommendation based

18   on the identified error.

19   27.   The system of Claim 26, wherein the comparing means further comprises means

20   for identifying one or more errors for each incorrect response.

21   28.   The system of Claim 26, wherein the recommender further comprises means

22   for identifying a deficient skill by comparing the identified error to a deficient skill rule

23   and means for generating a training module recommendation based on the identified deficient

24   skill.

25   29.   The system of Claim 1, wherein the teacher station further comprises means for

26   dynamically generating one or more data reports that illustrate the data associated with the one or

27   more tests.

28   30.   The system of Claim 29, wherein the data reports further comprises means for

29   displaying the test results simultaneously for one or more students.

30   31.   The system of Claim 30, wherein the displaying means further comprises means

31   for displaying the percentage of correct responses for a test.

32   32.   The system of Claim 30, wherein the displaying means further comprises means

33   for displaying the results for one or more different tests for each user wherein the results for each

34   test are displayed in a different color.

35   33.   The system of Claim 29, wherein the data report generator further comprises a

36   user interface for browsing other test data for a user.

37   34.   The system of Claim 29, wherein the data report generator further comprises

38   means for determining the number of user test results shown.

39   35.   The system of Claim 29, wherein the data report generator further comprises

40   means for permitting the user to select a data report print format.

41   36.   The system of Claim 29, wherein the data report generator further comprises

42   means for permitting the user to select a data report display format.

43   37.   The system of Claim 29, wherein the data report generator further comprises

44   means for generating a data report for one or more students in a class, means for generating a

45   data report for one or more classes each having one or more students and means for generating a

46   data report for a school having one or more classes.

47   38.   The system of Claim 1, wherein the teacher station further comprises means for

48   communicating the response for each test for each student back to the server computer.

49   39.   The system of Claim 38, wherein the teacher station further comprises means

50   for detecting a break in the communication between the teacher station and the server

51   computer and means for resending any test data that was not sent due to the communications

52   break.

53   40.   The system of Claim 1, wherein each student computer further comprises means

54   for connecting to the teacher station and means for downloading the resources necessary to

55   execute the current test when the test is started.

56   41.   The system of Claim 1, wherein the teacher station further comprises means for

57   generating a classroom layout showing an icon for each student computer.

58   42.   The system of Claim 41, wherein the teacher station further comprises means for

59   monitoring each student's test progress and controlling each student computer.

60   43.   The system of Claim 41, wherein the teacher station further comprises means for

61   collecting student test data.

62   44.   The system of Claim 41, wherein generating the layout further comprises

63   means for coloring each icon depending on the state of testing for the particular student

64   computer.

65   45.   The system of Claim 1, wherein the teacher station further comprises means for

66   generating one or more separate accounts for the diagnostic system, wherein the accounts include

67   a lead teacher for managing the use of the diagnostic system by one or more classroom teachers

68   in a particular school and one or more classroom teachers who each administer the diagnostic

69   testing for a particular class of students.

70   46.   The system of Claim 45, wherein the teacher station further comprises means for

71   each lead teacher to register one or more classroom teachers who administer the test and means

72   for each classroom teacher to register one or more students who are taking the test.

73   47.   The system of Claim 46, wherein the lead teacher has access to testing data for the

74   entire school and each classroom teacher has access to testing data for the students in the class of

75   the classroom teacher.

76   48.   A portable media product having one or more instructions for implementing a

77   computer implemented system for testing one or more skills associated with the reading skills of

78   an individual, the portable media product comprising:

79   instructions for one or more tests for determining deficiencies in one or more reading and

80   pre-reading skills;

81   instructions for determining a score for each test;

82   instructions that cause a student computer to display at least one of a graphical image and

83   audio associated with each test;

84   instructions that receive a user response to one of the graphical images and audio

85   presented by each test; and

86   instructions that communicate the test data to a computer that is executing the

87   instructions of the portable media product.

88   49.   The portable media product of Claim 48 further comprising instructions for

89   recommending, based on the scores of the one or more tests, one or more training modules for

90   improving a reading or pre-reading skill of the individual as indicated by the score of the tests.

1   50.   The portable media product of Claim 48 further comprising instructions for

2   generating a questionnaire having one or more questions for eliciting information about risk

3   factors associated with language-based learning disabilities.

1   51.   The portable media product of Claim 50, wherein the information comprises

2   historical data about reading-related risk factors including one or more of medical conditions

3   including chronic otitis media, family history data including history of dyslexia, environmental

4   data including socioeconomic status and exposure to literacy at home and observational data

5   about an individual's behaviors reflecting competencies in speech sound awareness.

1   52.   The portable media product of Claim 48 further comprising instructions for

2   receiving a verbal response from the user to the one or more tests using speed recognition.

1   53.   The portable media product of Claim 48 further comprising instructions to

2   generate one or more tests comprising a rhyme recognition test for testing the ability to recognize

3   rhymes, a rhyme generation test for testing the ability to generate rhymes, a beginning and

4   ending sound recognizer for testing the ability to recognize the beginning and ending sounds of a

5   word, a word decoder test for testing the ability to read by sounding out a written word, a sound

6   blender test for testing the ability to blend sound units together to form words, a sound

7   segmenting test for testing the ability to segment a sound unit into smaller sound units, a sound

8   manipulator test for testing the ability to manipulate sound units to form a new unit, a sequential

9   verbal recall test for testing the ability to recall a sequence of spoken items, a rapid naming test

10   for testing the ability to rapidly name one or more items, a letter naming and symbol/sound

11   association test for testing the ability to name letters and identify the association between a

12   symbol and an associated sound, and a fluent reader test for testing the ability to read fluently.

1   54.   The portable media product of Claim 48, wherein the tests further comprise a

2   rhyme recognition test further comprising instructions for providing at least two stimuli to the

3   user and instructions for receiving user input in response to the at least two stimuli to determine

4   the user's ability to recognize rhyming words.

1   55.   The portable media product of Claim 48, wherein the tests further comprise a test

2   for recognizing the beginning sound of a stimulus, the test comprising instructions for generating

3   at least one stimulus having at least an initial phoneme and instructions for receiving a response

4   to the stimulus that indicates an ability of the test taker to recognize the initial phoneme of the

5   stimulus.

1   56.   The portable media product of Claim 48, wherein the tests further comprise a test

2   for recognizing the ending sound of a stimulus, the test comprising instructions for generating at

3   least one stimulus having at least an ending phoneme and instructions for receiving a response to

4   the stimulus that indicates an ability of the test taker to recognize the ending phoneme of the

5   stimulus.

1   57.   The portable media product of Claim 48, wherein the tests further comprise a

2   rhyme generation test comprising instructions for generating a stimulus and instructions for

3   receiving a response from the user identifying a sound unit that rhymes with the stimulus.

1   58.   The portable media product of Claim 48, wherein the tests further comprise a

2   sound blender test comprising instructions for generating at least two sound stimuli and

3   instructions for receiving a user response to the at least two sound stimuli, the response

4   indicating an ability to blend the at least two sound stimuli into a larger sound unit.

1   59.   The portable media product of Claim 48, wherein the tests further comprise a

2   sound segmentation test comprising instructions for generating at least one stimulus and

3   instructions for receiving a response to the stimulus comprising instructions for segmenting the

4   stimulus into smaller units in order to test the ability to segment the stimulus into smaller units.

1   60.   The portable media product of Claim 48, wherein the tests comprise a sound

2   manipulation test comprising instructions for generating a sound stimulus having one or more

3   sound units and instructions, in response to the sound stimulus, for manipulating the sound units

4   of the sound stimulus to test the ability to manipulate sound units.

1   61.   The portable media product of Claim 48, wherein the tests further comprise a

2   verbal recall test comprising instructions for generating at least one sound stimulus and

3   instructions, in response to the at least one sound stimulus, for receiving a user response

4   indicating the recalling of the at least one sound stimulus.

1   62.   The portable media product of Claim 52 further comprising instructions for

2   receiving a verbal response from the user into the speech recognition device for receiving a

3   verbal response from the user.

1   63.   The portable media product of Claim 48, wherein the tests further comprise a

2   naming test comprising instructions for generating at least one visual stimulus and instructions,

3   in response to the display of the visual stimulus, for speaking the name of or the sound associated

4   with the visual stimulus using the speech recognition device.

1   64.   The portable media product of Claim 48, wherein the tests further comprise a

2   word decoder test comprising instructions for displaying a visual stimulus to the user and

3   instructions, in response to the visual stimulus, for receiving a response from the user to

4   determine the ability to read the visual stimulus.

1   65.   The portable media product of Claim 48, wherein the tests further comprise a

2   fluency test comprising instructions for generating a plurality of visual stimuli and instructions

3   for receiving a user's response to the visual stimuli within a predetermined time interval to

4   determine the user's ability to read and understand the visual stimuli.

5   66.   The portable media product of Claim 48 further comprising instructions for

6   motivating the user to complete the tests.

7   67.   The portable media product of Claim 66, wherein the motivation instructions

8   further comprises instructions for generating a graphical image and an associated sound to

9   motivate the user to complete the tests.

1   68.   The portable media product of Claim 67, wherein the motivation instructions

2   further comprises instructions for generating the graphical image and associated sound after a

3   first predetermined number of tests are completed and instructions for generating another

4   graphical image and associated sound after a second predetermined number of tests are

5   completed.

6   69.   The portable media product of Claim 68, wherein the generating instructions

7   further comprises instructions for generating a graphical image indicating the number of tests

8   remaining to be completed.

9   70.   The portable media product of Claim 68, wherein the motivation instructions

10   further comprises instructions for generating the graphical image and associated sound after a

11   third predetermined number of tests.

12   71.   The portable media product of Claim 49, wherein the recommending instructions

13   further comprises instructions for downloading the recommended training module from the

14   teacher station to the student computer.

15   72.   The portable media product of Claim 49, wherein the recommender further

16   comprises instructions for storing the incorrect responses to the one or more tests and

17   instructions for generating a training module recommendation based on the incorrect responses.

18   73.   The portable media product of Claim 72, wherein the recommender further

19   comprises instructions for comparing each incorrect response to one or more error measures to

20   identify an error associated with each incorrect response and instructions for generating a

21   training module recommendation based on the identified error.

22   74.   The portable media product of Claim 73, wherein the comparing instructions

23   further comprises instructions for identifying one or more errors for each incorrect response.

24   75.   The portable media product of Claim 73, wherein the recommender further

25   comprises instructions for identifying a deficient skill by comparing the identified error to a

26   deficient skill rule and instructions for generating a training module recommendation based on

27   the identified deficient skill.

28   76.   The portable media product of Claim 48, wherein the teacher station further

29   comprises instructions for dynamically generating one or more data reports that illustrate the data

30   associated with the one or more tests.

31   77.   The portable media product of Claim 76, wherein the data reports further

32   comprises instructions for displaying the test results simultaneously for one or more students.

33   78.   The portable media product of Claim 77, wherein the displaying instructions

34   further comprises instructions for displaying the percentage of correct responses for a test.

79.   The portable media product of Claim 77, wherein the displaying instructions further comprises instructions for displaying the results for one or more different tests for each user wherein the results for each test are displayed in a different color.

80.   The portable media product of Claim 76, wherein the data report generator further comprises instructions that generate a user interface for browsing other test data for a user.

81.   The portable media product of Claim 76, wherein the data report generator further comprises instructions for determining the number of user test results shown.

82.   The portable media product of Claim 76, wherein the data report generator further comprises instructions for permitting the user to select a data report print format.

83.   The portable media product of Claim 76, wherein the data report generator further comprises instructions for permitting the user to select a data report display format.

84.   The portable media product of Claim 76, wherein the data report generator further comprises instructions for generating a data report for one or more students in a class, instructions for generating a data report for one or more classes each having one or more students and instructions for generating a data report for a school having one or more classes.

85.   The portable media product of Claim 48 further comprises instructions for communicating the response for each test for each student back to the server computer.

86.   The portable media product of Claim 85 further comprises instructions for detecting a break in the communication between the teacher station and the server computer and instructions for resending any test data that was not sent due to the communications break.

87.   The portable media product of Claim 48, wherein each student computer further comprises instructions for connecting to the teacher station and instructions for downloading the resources necessary to execute the current test when the test is started.

88.   The portable media product of Claim 48, wherein the teacher station further comprises instructions for generating a classroom layout showing an icon for each student computer.

89.   The portable media product of Claim 88, wherein the teacher station further comprises instructions for monitoring each student's test progress and controlling each student computer.

64   90.   The portable media product of Claim 88, wherein the teacher station further

65   comprises instructions for collecting student test data.

66   91.   The portable media product of Claim 88, wherein generating the layout further

67   comprises instructions for coloring each icon depending on the state of testing for the particular

68   student computer.

69   92.   The portable media product of Claim 48, wherein the teacher station further

70   comprises instructions for generating one or more separate accounts for the diagnostic system,

71   wherein the accounts include a lead teacher for managing the use of the diagnostic system by one

72   or more classroom teachers in a particular school and one or more classroom teachers who each

73   administer the diagnostic testing for a particular class of students.

74   93.   The portable media product of Claim 92, wherein the teacher station further

75   comprises instructions for each lead teacher to register one or more classroom teachers who

76   administer the test and instructions for each classroom teacher to register one or more students

77   who are taking the test.

78   94.   The portable media product of Claim 93, wherein the lead teacher has access to

79   testing data for the entire school and each classroom teacher has access to testing data for the

80   students in the class of the classroom teacher.

81

82   95.   A system for testing one or more skills associated with the reading skills of an

83   individual, comprising:

84   a server computer comprising one or more tests for determining deficiencies in

85   one or more reading and pre-reading skills, a scorer for determining a score for each test; and

86   one or more client computers that establish a communications session with the

87   server computer to download the one or more tests from the server computer, each client

88   computer comprising means for displaying at least one of a graphical image and audio associated

89   with each test located on the server, means for receiving a user response to one of the graphical

90   images and audio presented by each test, means for communicating the responses for each test

91   back to the server computer, and means for motivating the user to complete the tests.

92   96.   The system of Claim 95, wherein the server computer further comprises a

93   recommender for recommending, based on the scores of the one or more tests, one or more

94 training modules for improving a reading or pre-reading skill of the individual as indicated by

95 the score of the tests.

96

1   97.   The system of Claim 95, wherein the server further comprises a questionnaire

2 having one or more questions for eliciting information about risk factors associated with

3 language-based learning disabilities.

4

1   98.   The system of Claim 97, wherein the information comprises historical data about

2 reading-related risk factors including one or more of medical conditions including chronic otitis

3 media, family history data including history of dyslexia, environmental data including

4 socioeconomic status and exposure to literacy at home and observational data about an

5 individual's behaviors reflecting competencies in speech sound awareness.

6

1   99.   The system of Claim 95, wherein the user input device of the one or more client

2 computers comprise a speech recognition device for receiving a verbal response from the user to

3 the one or more tests.

4

1   100.   The system of Claim 95, wherein the one or more tests comprise a rhyme

2 recognition test for testing the ability to recognize rhymes, a rhyme generation test for testing the

3 ability to generate rhymes, a beginning and ending sound recognizer for testing the ability to

4 recognize the beginning and ending sounds of a word, a word decoder test for testing the ability

5 to read by sounding out a written word, a sound blender test for testing the ability to blend sound

6 units together to form words, a sound segmenting test for testing the ability to segment a sound

7 unit into smaller sound units, a sound manipulator test for testing the ability to manipulate sound

8 units to form a new unit, a sequential verbal recall test for testing the ability to recall a sequence

9 of spoken items, a rapid naming test for testing the ability to rapidly name one or more items, a

10 letter naming and symbol/sound association test for testing the ability to name letters and identify

11 the association between a symbol and an associated sound, and a fluent reader test for testing the

12 ability to read fluently.

13

1   101.   The system of Claim 95, wherein the tests further comprise a rhyme recognition

2   test further comprising means for providing at least two stimuli to the user and means for

3   receiving user input in response to the at least two stimuli to determine the user's ability to

4   recognize rhyming words.

5

1   102.   The system of Claim 95, wherein the tests further comprise a test for recognizing

2   the beginning sound of a stimulus, the test comprising means for generating at least one stimulus

3   having at least an initial phoneme and means for receiving a response to the stimulus that

4   indicates an ability of the test taker to recognize the initial phoneme of the stimulus.

5

1   103.   The system of Claim 95, wherein the tests further comprise a test for recognizing

2   the ending sound of a stimulus, the test comprising means for generating at least one stimulus

3   having at least an ending phoneme and means for receiving a response to the stimulus that

4   indicates an ability of the test taker to recognize the ending phoneme of the stimulus.

5

1   104.   The system of Claim 95, wherein the tests further comprise a rhyme generation

2   test comprising means for generating a stimulus and means for receiving a response from the

3   user identifying a sound unit that rhymes with the stimulus.

4

1   105.   The system of Claim 95, wherein the tests further comprise a sound blender test

2   comprising means for generating at least two sound stimuli and means for receiving a user

3   response to the at least two sound stimuli, the response indicating an ability to blend the at least

4   two sound stimuli into a larger sound unit.

5

1   106.   The system of Claim 95, wherein the tests further comprise a sound segmentation

2   test comprising means for generating at least one stimulus and means for receiving a response to

3   the stimulus comprising means for segmenting the stimulus into smaller units in order to test the

4   ability to segment the stimulus into smaller units.

5

107. The system of Claim 95, wherein the tests comprise a sound manipulation test comprising means for generating a sound stimulus having one or more sound units and means, in response to the sound stimulus, for manipulating the sound units of the sound stimulus to test the ability to manipulate sound units.

108. The system of Claim 95, wherein the tests further comprise a verbal recall test comprising means for generating at least one sound stimulus and means, in response to the at least one sound stimulus, for receiving a user response indicating the recalling of the at least one sound stimulus.

109. The system of Claim 99 further comprising means for speaking a verbal response into the speech recognition device for receiving a verbal response from the user.

110. The system of Claim 95, wherein the tests further comprise a naming test comprising means for generating at least one visual stimulus and means, in response to the display of the visual stimulus, for speaking the name of or the sound associated with the visual stimulus using the speech recognition device.

111. The system of Claim 95, wherein the tests further comprise a word decoder test comprising means for displaying a visual stimulus to the user and means, in response to the visual stimulus, for receiving a response from the user to determine the ability to read the visual stimulus.

112. The system of Claim 95, wherein the tests further comprise a fluency test comprising means for generating a plurality of visual stimuli and means for receiving a user's response to the visual stimuli within a predetermined time interval to determine the user's ability to read and understand the visual stimuli.

113. The system of Claim 95, wherein the motivation means further comprises means for generating a graphical image and an associated sound to motivate the user to complete the tests.

1   114.   The system of Claim 113, wherein the motivation means further comprises means

2   for generating the graphical image and associated sound after a first predetermined number of

3   tests are completed and means for generating another graphical image and associated sound after

4   a second predetermined number of tests are completed.

5   115.   The system of Claim 114, wherein the generating means further comprises means

6   for generating a graphical image indicating the number of tests remaining to be completed.

.7   116.   The system of Claim 114, wherein the motivation means further comprises means

8   for generating the graphical image and associated sound after a third predetermined number of

9   tests.

10   117.   The system of Claim 96, wherein the recommender further comprises means for

11   downloading the recommended training module to the client computer.

12   118.   The system of Claim 96, wherein the recommender further comprises means for

13   storing the incorrect responses to the one or more tests and means for generating a training

14   module recommendation based on the incorrect responses.

15   119.   The system of Claim 118, wherein the recommender further comprises means for

16   comparing each incorrect response to one or more error measures to identify an error associated

17   with each incorrect response and means for generating a training module recommendation based

18   on the identified error.

19   120.   The system of Claim 119, wherein the comparing means further comprises means

20   for identifying one or more errors for each incorrect response.

21   121.   The system of Claim 119, wherein the recommender further comprises means for

22   identifying a deficient skill by comparing the identified error to a deficient skill rule and means

23   for generating a training module recommendation based on the identified deficient skill.

24   122.   The system of Claim 95, wherein the server further comprises means for

25   dynamically generating one or more data reports that illustrate the data associated with the one or

26   more tests.

27   123.   The system of Claim 122, wherein the data reports further comprises means for

28   displaying the test results simultaneously for one or more students.

29   124.   The system of Claim 123, wherein the displaying means further comprises means

30   for displaying the percentage of correct responses for a test.

31   125.   The system of Claim 123, wherein the displaying means further comprises means

32 for displaying the results for one or more different tests for each user wherein the results for each

33 test are displayed in a different color.

34   126.   The system of Claim 122, wherein the data report generator further comprises a

35 user interface for browsing other test data for a user.

36   127.   The system of Claim 122, wherein the data report generator further comprises

37 means for determining the number of user test results shown.

38   128.   The system of Claim 122, wherein the data report generator further comprises

39 means for permitting the user to select a data report print format.

40   129.   The system of Claim 122, wherein the data report generator further comprises

41 means for permitting the user to select a data report display format.

42   130.   The system of Claim 122, wherein the data report generator further comprises

43 means for generating a data report for one or more students in a class, means for generating a

44 data report for one or more classes each having one or more students and means for generating a

45 data report for a school having one or more classes.

46   131.   The system of Claim 95, wherein the client computer further comprises a teacher

47 station that downloads the tests from the server and one or more student computers connected to

48 the teacher station by a network, each student computer further comprising means for displaying

49 at least one of a graphical image and audio associated with each test located on the server, means

50 for receiving a user response to one of the graphical images and audio presented by each test and

51 means for communicating the responses for each test back to the teacher station.

52   132.   The system of Claim 131, wherein the teacher station further comprises means for

53 communicating the response for each test for each student back to the server computer.

54   133.   The system of Claim 132, wherein the teacher station further comprises means for

55 detecting a break in the communication between the teacher station and the server computer and

56 means for resending any test data that was not sent due to the communications break.

57   134.   The system of Claim 131, wherein each student computer further comprises

58 means for connecting to the server computer and means for downloading the resources necessary

59 to execute the current test when the test is started.

60   135.   The system of Claim 131, wherein the teacher station further comprises means for

61   generating a classroom layout showing an icon for each student computer.

62   136.   The system of Claim 135, wherein the teacher station further comprises means for

63   monitoring each student's test progress and controlling each student computer.

64   137.   The system of Claim 135, wherein the teacher station further comprises means for

65   collecting student test data.

66   138.   The system of Claim 135, wherein generating the layout further comprises means

67   for coloring each icon depending on the state of testing for the particular student computer.

68   139.   The system of Claim 131, wherein the teacher station further comprises means for

69   generating one or more separate accounts for the diagnostic system, wherein the accounts include

70   an account manager for managing an entire school or district of users of the diagnostic system, a

71   lead teacher for managing the use of the diagnostic system by one or more classroom teachers in

72   a particular school and one or more classroom teachers who each administer the diagnostic

73   testing for a particular class of students.

74   140.   The system of Claim 139, wherein the teacher station further comprises means for

75   the account manager to register one or more lead teachers and means for each lead teacher to

76   register one or more classroom teachers who administer the test.

77   141.   The system of Claim 140, wherein the account manager has access to testing data

78   for the entire district, wherein the lead teacher has access to testing data for the entire school and

79   each classroom teacher has access to testing data for the class of the classroom teacher.

80

80   142.   A method for testing one or more skills associated with the reading skills of an

81 individual, comprising:

82   storing instructions corresponding to one or more tests on a server for determining

83 deficiencies in one or more reading and pre-reading skills and a scorer for determining a score

84 for each test;

85   downloading the one or more tests from the server computer by a client computer;

86   displaying at least one of a graphical image and audio associated with each test located

87 on the server at the client computer;

88   receiving a user response to one of the graphical images and audio presented by each test

89 at the client computer;

90   communicating the responses for each test back to the server computer; and

91   motivating the user to complete the tests.

92   143.   The method of Claim 142 further comprising recommending at the server, based

93 on the scores of the one or more tests, one or more training modules for improving a reading or

94 pre-reading skill of the individual as indicated by the score of the tests.

1   144.   The method of Claim 142 further comprising generating a questionnaire having

2   one or more questions for eliciting information about risk factors associated with language-based

3   learning disabilities.

1   145.   The method of Claim 144, wherein the information comprises historical data

2   about reading-related risk factors including one or more of medical conditions including chronic

3   otitis media, family history data including history of dyslexia, environmental data including

4   socioeconomic status and exposure to literacy at home and observational data about an

5   individual's behaviors reflecting competencies in speech sound awareness.

1   146.   The method of Claim 142 further comprising receiving a verbal response from a

2   user to one or more tests using a speech recognition device.

1   147.   The method of Claim 142, wherein the one or more tests comprise a rhyme

2   recognition test for testing the ability to recognize rhymes, a rhyme generation test for testing the

3   ability to generate rhymes, a beginning and ending sound recognizer for testing the ability to

4   recognize the beginning and ending sounds of a word, a word decoder test for testing the ability

5   to read by sounding out a written word, a sound blender test for testing the ability to blend sound

6   units together to form words, a sound segmenting test for testing the ability to segment a sound

7   unit into smaller sound units, a sound manipulator test for testing the ability to manipulate sound

8   units to form a new unit, a sequential verbal recall test for testing the ability to recall a sequence

9   of spoken items, a rapid naming test for testing the ability to rapidly name one or more items, a

10   letter naming and symbol/sound association test for testing the ability to name letters and identify

11   the association between a symbol and an associated sound, and a fluent reader test for testing the

12   ability to read fluently.

1   148.   The method of Claim 142, wherein the tests further comprise a rhyme recognition

2   test further comprising providing at least two stimuli to the user and receiving user input in

3   response to the at least two stimuli to determine the user's ability to recognize rhyming words.

1   149.   The method of Claim 142, wherein the tests further comprise a test for

2   recognizing the beginning sound of a stimulus, the test comprising generating at least one

3   stimulus having at least an initial phoneme and receiving a response to the stimulus that indicates

4   an ability of the test taker to recognize the initial phoneme of the stimulus.

1   150.   The method of Claim 142, wherein the tests further comprise a test for

2   recognizing the ending sound of a stimulus, the test comprising generating at least one stimulus

3   having at least an ending phoneme and receiving a response to the stimulus that indicates an

4   ability of the test taker to recognize the ending phoneme of the stimulus.

1   151.   The method of Claim 142, wherein the tests further comprise a rhyme generation

2   test comprising generating a stimulus and receiving a response from the user identifying a sound

3   unit that rhymes with the stimulus.

1   152.   The method of Claim 142, wherein the tests further comprise a sound blender test

2   comprising generating at least two sound stimuli and receiving a user response to the at least two

3   sound stimuli, the response indicating an ability to blend the at least two sound stimuli into a

4   larger sound unit.

1   153.   The method of Claim 142, wherein the tests further comprise a sound

2   segmentation test comprising generating at least one stimulus and receiving a response to the

3   stimulus comprising means for segmenting the stimulus into smaller units in order to test the

4   ability to segment the stimulus into smaller units.

1   154.   The method of Claim 142, wherein the tests comprise a sound manipulation test

2   comprising generating a sound stimulus having one or more sound units and, in response to the

3   sound stimulus, manipulating the sound units of the sound stimulus to test the ability to

4   manipulate sound units.

1   155.   The method of Claim 142, wherein the tests further comprise a verbal recall test

2   comprising generating at least one sound stimulus and, in response to the at least one sound

3   stimulus, receiving a user response indicating the recalling of the at least one sound stimulus.

1   156.   The method of Claim 146 further comprising speaking a verbal response into the

2   speech recognition device for receiving a verbal response from the user.

1   157.   The method of Claim 142, wherein the tests further comprise a naming test

2   comprising generating at least one visual stimulus and, in response to the display of the visual

3   stimulus, speaking the name of or the sound associated with the visual stimulus using the speech

4   recognition device.

1   158.   The method of Claim 142, wherein the tests further comprise a word decoder test

2   comprising displaying a visual stimulus to the user and, in response to the visual stimulus,

3   receiving a response from the user to determine the ability to read the visual stimulus.

1   159.   The method of Claim 142, wherein the tests further comprise a fluency test

2   comprising generating a plurality of visual stimuli and receiving a user's response to the visual

3   stimuli within a predetermined time interval to determine the user's ability to read and

4   understand the visual stimuli.

5   160.   The method of Claim 142, wherein the motivation further comprises generating a

6   graphical image and an associated sound to motivate the user to complete the tests.

1   161.   The method of Claim 160, wherein the motivation further comprises generating

2   the graphical image and associated sound after a first predetermined number of tests are

3   completed and generating another graphical image and associated sound after a second

4   predetermined number of tests are completed.

5   162.   The method of Claim 161, wherein the generating further comprises generating a

6   graphical image indicating the number of tests remaining to be completed.

7   163.   The method of Claim 161, wherein the motivation further comprises generating

8   the graphical image and associated sound after a third predetermined number of tests.

9   164.   The method of Claim 143, wherein the recommender further comprises

10   downloading the recommended training module to the client computer.

11   165.   The method of Claim 143, wherein the recommender further comprises storing

12   the incorrect responses to the one or more tests and generating a training module

13   recommendation based on the incorrect responses.

14   166.   The method of Claim 165, wherein the recommender further comprises

15   comparing each incorrect response to one or more error measures to identify an error associated

16   with each incorrect response and generating a training module recommendation based on the

17   identified error.

18   167.   The method of Claim 166, wherein the comparing further comprises identifying

19   one or more errors for each incorrect response.

20   168.   The method of Claim 166, wherein the recommender further comprises

21   identifying a deficient skill by comparing the identified error to a deficient skill rule and

22   generating a training module recommendation based on the identified deficient skill.

23   169.   The method of Claim 142 further comprising dynamically generating one or more

24   data reports that illustrate the data associated with the one or more tests.

25   170.   The method of Claim 169, wherein the data reports further comprises displaying

26   the test results simultaneously for one or more students.

27   171.   The method of Claim 170, wherein the displaying further comprises displaying

28   the percentage of correct responses for a test.

29   172.   The method of Claim 170, wherein the displaying further comprises displaying

30   the results for one or more different tests for each user wherein the results for each test are

31   displayed in a different color.

32   173.   The method of Claim 169, wherein the data report generator further comprises a

33   user interface for browsing other test data for a user.

34   174.   The method of Claim 169, wherein the data report generator further comprises

35   determining the number of user test results shown.

36   175.   The method of Claim 169, wherein the data report generator further comprises

37   permitting the user to select a data report print format.

38   176.   The method of Claim 169, wherein the data report generator further comprises

39   permitting the user to select a data report display format.

40   177.   The method of Claim 169, wherein the data report generator further comprises

41   generating a data report for one or more students in a class, generating a data report for one or

42   more classes each having one or more students, generating a data report for a school having one

43   or more classes, and generating a data

44

45   178.   The method of Claim 142, wherein the client computer further comprises a

46   teacher station that downloads the tests from the server and one or more student computers

47   connected to the teacher station by a network, each student computer further comprising

48   displaying at least one of a graphical image and audio associated with each test located on the

49 server, receiving a user response to one of the graphical images and audio presented by each test

50 and communicating the responses for each test back to the teacher station.

51   179.   The method of Claim 178, wherein the teacher station further comprises

52 communicating the response for each test for each student back to the server computer.

53   180.   The method of Claim 179, wherein the teacher station further comprises detecting

54 a break in the communication between the teacher station and the server computer and resending

55 any test data that was not sent due to the communications break.

56   181.   The method of Claim 178, wherein each student computer further comprises

57 connecting to the server computer and downloading the resources necessary to execute the

58 current test when the test is started.

59   182.   The method of Claim 178, wherein the teacher station further comprises

60 generating a classroom layout showing an icon for each student computer.

61   183.   The method of Claim 182, wherein the teacher station further comprises

62 monitoring each student's test progress and controlling each student computer.

63   184.   The method of Claim 182, wherein the teacher station further comprises

64 collecting student test data.

65   185.   The method of Claim 182, wherein generating the layout further comprises

66 coloring each icon depending on the state of testing for the particular student computer.

67   186.   The method of Claim 178, wherein the teacher station further comprises

68 generating one or more separate accounts for the diagnostic system, wherein the accounts include

69 an account manager for managing an entire school or district of users of the diagnostic system, a

70 lead teacher for managing the use of the diagnostic system by one or more classroom teachers in

71 a particular school and one or more classroom teachers who each administer the diagnostic

72 testing for a particular class of students.

73   187.   The method of Claim 186, wherein the teacher station further comprises a user

74 interface for the account manager to register one or more lead teachers and a user interface for

75 each lead teacher to register one or more classroom teachers who administer the test.

76   188.   The method of Claim 187, wherein the account manager has access to testing data

77 for the entire district, wherein the lead teacher has access to testing data for the entire school and

78 each classroom teacher has access to testing data for the class of the classroom teacher.

79

79   189.   A system for testing one or more skills associated with the reading skills of an

80   individual, comprising:

81   a server computer comprising one or more tests for determining deficiencies in one or

82   more reading and pre-reading skills, a scorer for determining a score for each test; and

83   one or more client computers that establish a communications session with the server

84   computer to download the one or more tests from the server computer, each client computer

85   comprising means for displaying at least one of a graphical image and audio associated with each

86   test located on the server, means for receiving a user response to one of the graphical images and

87   audio presented by each test, means for communicating the responses for each test back to the

88   server computer, and a recommender for recommending, based on the scores of the one or more

89   tests, one or more training modules for improving a reading or pre-reading skill of the individual

90   as indicated by the score of the tests.

91   190.   The system of Claim 189, wherein each client computer further comprises means

92   for motivating the user to complete the tests.

93   191.   The system of Claim 189, wherein the server further comprises a

94   questionnaire having one or more questions for eliciting information about risk factors associated

95   with language-based learning disabilities.

1   192.   The system of Claim 191, wherein the information comprises historical data about

2   reading-related risk factors including one or more of medical conditions including chronic otitis

3   media, family history data including history of dyslexia, environmental data including

4   socioeconomic status and exposure to literacy at home and observational data about an

5   individual's behaviors reflecting competencies in speech sound awareness.

1   193.   The system of Claim 189, wherein the user input device of the one or more client

2   computers comprise a speech recognition device for receiving a verbal response from the user to

3   the one or more tests.

1   194.   The system of Claim 189, wherein the one or more tests comprise a rhyme

2   recognition test for testing the ability to recognize rhymes, a rhyme generation test for testing the

3   ability to generate rhymes, a beginning and ending sound recognizer for testing the ability to

4   recognize the beginning and ending sounds of a word, a word decoder test for testing the ability

5   to read by sounding out a written word, a sound blender test for testing the ability to blend sound

6   units together to form words, a sound segmenting test for testing the ability to segment a sound

7   unit into smaller sound units, a sound manipulator test for testing the ability to manipulate sound

8   units to form a new unit, a sequential verbal recall test for testing the ability to recall a sequence

9   of spoken items, a rapid naming test for testing the ability to rapidly name one or more items, a

10 letter naming and symbol/sound association test for testing the ability to name letters and identify

11 the association between a symbol and an associated sound, and a fluent reader test for testing the

12 ability to read fluently.

1   195.   The system of Claim 189, wherein the tests further comprise a rhyme recognition

2   test further comprising means for providing at least two stimuli to the user and means for

3   receiving user input in response to the at least two stimuli to determine the user's ability to

4   recognize rhyming words.

1   196.   The system of Claim 189, wherein the tests further comprise a test for recognizing

2   the beginning sound of a stimulus, the test comprising means for generating at least one stimulus

3   having at least an initial phoneme and means for receiving a response to the stimulus that

4   indicates an ability of the test taker to recognize the initial phoneme of the stimulus.

1   197.   The system of Claim 189, wherein the tests further comprise a test for recognizing

2   the ending sound of a stimulus, the test comprising means for generating at least one stimulus

3   having at least an ending phoneme and means for receiving a response to the stimulus that

4   indicates an ability of the test taker to recognize the ending phoneme of the stimulus.

1   198.   The system of Claim 189, wherein the tests further comprise a rhyme generation

2   test comprising means for generating a stimulus and means for receiving a response from the

3   user identifying a sound unit that rhymes with the stimulus.

1   199.   The system of Claim 189, wherein the tests further comprise a sound blender test

2 comprising means for generating at least two sound stimuli and means for receiving a user

3 response to the at least two sound stimuli, the response indicating an ability to blend the at least

4 two sound stimuli into a larger sound unit.

1   200.   The system of Claim 189, wherein the tests further comprise a sound

2 segmentation test comprising means for generating at least one stimulus and means for receiving

3 a response to the stimulus comprising means for segmenting the stimulus into smaller units in

4 order to test the ability to segment the stimulus into smaller units.

1   201.   The system of Claim 189, wherein the tests comprise a sound manipulation test

2 comprising means for generating a sound stimulus having one or more sound units and means, in

3 response to the sound stimulus, for manipulating the sound units of the sound stimulus to test the

4 ability to manipulate sound units.

1   202.   The system of Claim 189, wherein the tests further comprise a verbal recall test

2 comprising means for generating at least one sound stimulus and means, in response to the at

3 least one sound stimulus, for receiving a user response indicating the recalling of the at least one

4   sound stimulus.

1   203.   The system of Claim 193 further comprising means for speaking a verbal

2 response into the speech recognition device for receiving a verbal response from the user.

1   204.   The system of Claim 189, wherein the tests further comprise a naming test

2 comprising means for generating at least one visual stimulus and means, in response to the

3 display of the visual stimulus, for speaking the name of or the sound associated with the visual

4 stimulus using the speech recognition device.

1   205.   The system of Claim 189, wherein the tests further comprise a word decoder test

2 comprising means for displaying a visual stimulus to the user and means, in response to the

3   visual stimulus, for receiving a response from the user to determine the ability to read the visual

4   stimulus.

1   206.   The system of Claim 189, wherein the tests further comprise a fluency test

2   comprising means for generating a plurality of visual stimuli and means for receiving a user's

3   response to the visual stimuli within a predetermined time interval to determine the user's ability

4   to read and understand the visual stimuli.

5

6   207.   The system of Claim 190, wherein the motivation means further comprises means

7   for generating a graphical image and an associated sound to motivate the user to complete the

8   tests.

1   208.   The system of Claim 207, wherein the motivation means further comprises means

2   for generating the graphical image and associated sound after a first predetermined number of

3   tests are completed and means for generating another graphical image and associated sound after

4   a second predetermined number of tests are completed.

5   209.   The system of Claim 208, wherein the generating means further comprises means

6   for generating a graphical image indicating the number of tests remaining to be completed.

7   210.   The system of Claim 208, wherein the motivation means further comprises means

8   for generating the graphical image and associated sound after a third predetermined number of

9   tests.

10   211.   The system of Claim 189, wherein the recommender further comprises means for

11   downloading the recommended training module to the client computer.

12   212.   The system of Claim 189, wherein the recommender further comprises means for

13   storing the incorrect responses to the one or more tests and means for generating a training

14   module recommendation based on the incorrect responses.

15   213.   The system of Claim 212, wherein the recommender further comprises means for

16   comparing each incorrect response to one or more error measures to identify an error associated

17   with each incorrect response and means for generating a training module recommendation based

18   on the identified error.

19   214.   The system of Claim 213, wherein the comparing means further comprises means

20   for identifying one or more errors for each incorrect response.

21   215.   The system of Claim 213, wherein the recommender further comprises means for

22   identifying a deficient skill by comparing the identified error to a deficient skill rule and means

23   for generating a training module recommendation based on the identified deficient skill.

24   216.   The system of Claim 189, wherein the server further comprises means for

25   dynamically generating one or more data reports that illustrate the data associated with the one or

26   more tests.

27   217.   The system of Claim 216, wherein the data reports further comprises means for

28   displaying the test results simultaneously for one or more students.

29   218.   The system of Claim 217, wherein the displaying means further comprises means

30   for displaying the percentage of correct responses for a test.

31   219.   The system of Claim 217, wherein the displaying means further comprises means

32   for displaying the results for one or more different tests for each user wherein the results for each

33   test are displayed in a different color.

34   220.   The system of Claim 216, wherein the data report generator further comprises a

35   user interface for browsing other test data for a user.

36   221.   The system of Claim 216, wherein the data report generator further comprises

37   means for determining the number of user test results shown.

38   222.   The system of Claim 216, wherein the data report generator further comprises

39   means for permitting the user to select a data report print format.

40   223.   The system of Claim 216, wherein the data report generator further comprises

41   means for permitting the user to select a data report display format.

42   224.   The system of Claim 216, wherein the data report generator further comprises

43   means for generating a data report for one or more students in a class, means for generating a

44   data report for one or more classes each having one or more students and means for generating a

45   data report for a school having one or more classes.

46   225.   The system of Claim 189, wherein the client computer further comprises a teacher

47   station that downloads the tests from the server and one or more student computers connected to

48   the teacher station by a network, each student computer further comprising means for displaying

49   at least one of a graphical image and audio associated with each test located on the server, means

50   for receiving a user response to one of the graphical images and audio presented by each test and

51   means for communicating the responses for each test back to the teacher station.

52   226.   The system of Claim 225, wherein the teacher station further comprises means for

53   communicating the response for each test for each student back to the server computer.

54   227.   The system of Claim 226, wherein the teacher station further comprises means for

55   detecting a break in the communication between the teacher station and the server computer and

56   means for resending any test data that was not sent due to the communications break.

57   228.   The system of Claim 225, wherein each student computer further comprises

58   means for connecting to the server computer and means for downloading the resources necessary

59   to execute the current test when the test is started.

60   229.   The system of Claim 225, wherein the teacher station further comprises means for

61   controlling each student computer.

62   230.   The system of Claim 225, wherein the teacher station further comprises means for

63   generating a classroom layout showing an icon for each student computer.

64   231.   The system of Claim 230, wherein the teacher station further comprises means for

65   monitoring each student's test progress and controlling each student computer.

66   232.   The system of Claim 230, wherein the teacher station further comprises means for

67   collecting student test data.

68   233.   The system of Claim 230, wherein generating the layout further comprises means

69   for coloring each icon depending on the state of testing for the particular student computer.

70   234.   The system of Claim 189, wherein the teacher station further comprises means for

71   generating one or more separate accounts for the diagnostic system, wherein the accounts include

72   an account manager for managing an entire school or district of users of the diagnostic system, a

73   lead teacher for managing the use of the diagnostic system by one or more classroom teachers in

74   a particular school and one or more classroom teachers who each administer the diagnostic

75   testing for a particular class of students.

76   235.   The system of Claim 234, wherein the teacher station further comprises means for

77   the account manager to register one or more lead teachers and means for each lead teacher to

78   register one or more classroom teachers who administer the test.

79   236.   The system of Claim 235, wherein the account manager has access to testing data

80   for the entire district, wherein the lead teacher has access to testing data for the entire school and

81   each classroom teacher has access to testing data for the class of the classroom teacher.

82

83   237.   A method for testing one or more skills associated with the reading skills of an

84   individual, comprising:

85   storing instructions corresponding to one or more tests on a server for determining

86   deficiencies in one or more reading and pre-reading skills and a scorer for determining a score

87   for each test;

88   downloading the one or more tests from the server computer by a client computer;

89   displaying at least one of a graphical image and audio associated with each test located

90   on the server at the client computer;

91   .   receiving a user response to one of the graphical images and audio presented by each test

92   at the client computer;

93   communicating the responses for each test back to the server computer; and

94   recommending at the server, based on the scores of the one or more tests, one or more

95   training modules for improving a reading or pre-reading skill of the individual as indicated by

96   the score of the tests.

1   238.   The method of Claim 237 further comprising motivating the user to complete the

2   tests.

3   239.   The method of Claim 237 further comprising generating a questionnaire having

4   one or more questions for eliciting information about risk factors associated with language-based

5   learning disabilities.

1   240.   The method of Claim 239, wherein the information comprises historical data

2   about reading-related risk factors including one or more of medical conditions including chronic

3   otitis media, family history data including history of dyslexia, environmental data including

4   socioeconomic status and exposure to literacy at home and observational data about an

5   individual's behaviors reflecting competencies in speech sound awareness.

1   241.   The method of Claim 237 further comprising receiving a verbal response from a

2   user to one or more tests using a speech recognition device.

1   242.   The method of Claim 237, wherein the one or more tests comprise a rhyme

2   recognition test for testing the ability to recognize rhymes, a rhyme generation test for testing the

3   ability to generate rhymes, a beginning and ending sound recognizer for testing the ability to

4   recognize the beginning and ending sounds of a word, a word decoder test for testing the ability

5   to read by sounding out a written word, a sound blender test for testing the ability to blend sound

6   units together to form words, a sound segmenting test for testing the ability to segment a sound

7   unit into smaller sound units, a sound manipulator test for testing the ability to manipulate sound

8   units to form a new unit, a sequential verbal recall test for testing the ability to recall a sequence

9   of spoken items, a rapid naming test for testing the ability to rapidly name one or more items, a

10   letter naming and symbol/sound association test for testing the ability to name letters and identify

11   the association between a symbol and an associated sound, and a fluent reader test for testing the

12   ability to read fluently.

1   243.   The method of Claim 237, wherein the tests further comprise a rhyme recognition

2   test further comprising providing at least two stimuli to the user and receiving user input in

3   response to the at least two stimuli to determine the user's ability to recognize rhyming words.

1   244.   The method of Claim 237, wherein the tests further comprise a test for

2   recognizing the beginning sound of a stimulus, the test comprising generating at least one

3   stimulus having at least an initial phoneme and receiving a response to the stimulus that indicates

4   an ability of the test taker to recognize the initial phoneme of the stimulus.

1   245.   The method of Claim 237, wherein the tests further comprise a test for

2   recognizing the ending sound of a stimulus, the test comprising generating at least one stimulus

3   having at least an ending phoneme and receiving a response to the stimulus that indicates an

4   ability of the test taker to recognize the ending phoneme of the stimulus.

1   246.   The method of Claim 237, wherein the tests further comprise a rhyme generation

2   test comprising generating a stimulus and receiving a response from the user identifying a sound

3   unit that rhymes with the stimulus.

1   247.   The method of Claim 237, wherein the tests further comprise a sound blender test

2   comprising generating at least two sound stimuli and receiving a user response to the at least two

3   sound stimuli, the response indicating an ability to blend the at least two sound stimuli into a

4   larger sound unit.

1   248.   The method of Claim 237, wherein the tests further comprise a sound

2   segmentation test comprising generating at least one stimulus and receiving a response to the

3   stimulus comprising means for segmenting the stimulus into smaller units in order to test the

4   ability to segment the stimulus into smaller units.

1   249.   The method of Claim 237, wherein the tests comprise a sound manipulation test

2   comprising generating a sound stimulus having one or more sound units and, in response to the

3   sound stimulus, manipulating the sound units of the sound stimulus to test the ability to

4   manipulate sound units.

1   250.   The method of Claim 237, wherein the tests further comprise a verbal recall test

2   comprising generating at least one sound stimulus and, in response to the at least one sound

3   stimulus, receiving a user response indicating the recalling of the at least one sound stimulus.

1   251.   The method of Claim 241 further comprising speaking a verbal response into the

2   speech recognition device for receiving a verbal response from the user.

1   252.   The method of Claim 237, wherein the tests further comprise a naming test

2   comprising generating at least one visual stimulus and, in response to the display of the visual

3   stimulus, speaking the name of or the sound associated with the visual stimulus using the speech

4   recognition device.

1   253.   The method of Claim 237, wherein the tests further comprise a word decoder test

2   comprising displaying a visual stimulus to the user and, in response to the visual stimulus,

3   receiving a response from the user to determine the ability to read the visual stimulus.

1   254.   The method of Claim 237, wherein the tests further comprise a fluency test

2   comprising generating a plurality of visual stimuli and receiving a user's response to the visual

3   stimuli within a predetermined time interval to determine the user's ability to read and

4   understand the visual stimuli.

5   255.   The method of Claim 237, wherein the motivation further comprises generating a

6   graphical image and an associated sound to motivate the user to complete the tests.

1   256.   The method of Claim 255, wherein the motivation further comprises generating

2   the graphical image and associated sound after a first predetermined number of tests are

3   completed and generating another graphical image and associated sound after a second

4   predetermined number of tests are completed.

5   257.   The method of Claim 256, wherein the generating further comprises generating a

6   graphical image indicating the number of tests remaining to be completed.

7   258.   The method of Claim 256, wherein the motivation further comprises generating

8   the graphical image and associated sound after a third predetermined number of tests.

9   259.   The method of Claim 238, wherein the recommender further comprises

10   downloading the recommended training module to the client computer.

11   260.   The method of Claim 238, wherein the recommender further comprises storing

12   the incorrect responses to the one or more tests and generating a training module

13   recommendation based on the incorrect responses.

14   261.   The method of Claim 260, wherein the recommender further comprises

15   comparing each incorrect response to one or more error measures to identify an error associated

16   with each incorrect response and generating a training module recommendation based on the

17   identified error.

18   262.   The method of Claim 261, wherein the comparing further comprises identifying

19 one or more errors for each incorrect response.

20   263.   The method of Claim 261, wherein the recommender further comprises

21 identifying a deficient skill by comparing the identified error to a deficient skill rule and

22 generating a training module recommendation based on the identified deficient skill.

23   264.   The method of Claim 237 further comprising dynamically generating one or more

24 data reports that illustrate the data associated with the one or more tests.

25   265.   The method of Claim 264, wherein the data reports further comprises displaying

26 the test results simultaneously for one or more students.

27   266.   The method of Claim 265, wherein the displaying further comprises displaying

28 the percentage of correct responses for a test.

29   267.   The method of Claim 265, wherein the displaying further comprises displaying

30 the results for one or more different tests for each user wherein the results for each test are

31 displayed in a different color.

32   268.   The method of Claim 264, wherein the data report generator further comprises a

33 user interface for browsing other test data for a user.

34   269.   The method of Claim 264, wherein the data report generator further comprises

35 determining the number of user test results shown.

36   270.   The method of Claim 264, wherein the data report generator further comprises

37 permitting the user to select a data report print format.

38   271.   The method of Claim 264, wherein the data report generator further comprises

39 permitting the user to select a data report display format.

40   272.   The method of Claim 264, wherein the data report generator further comprises

41 generating a data report for one or more students in a class, generating a data report for one or

42 more classes each having one or more students and generating a data report for a school having

43 one or more classes.

44

45   273.   The method of Claim 237, wherein the client computer further comprises a

46 teacher station that downloads the tests from the server and one or more student computers

47 connected to the teacher station by a network, each student computer further comprising

48 displaying at least one of a graphical image and audio associated with each test located on the

49 server, receiving a user response to one of the graphical images and audio presented by each test

50 and communicating the responses for each test back to the teacher station.

51   274.   The method of Claim 273, wherein the teacher station further comprises

52 communicating the response for each test for each student back to the server computer.

53   275.   The method of Claim 274, wherein the teacher station further comprises detecting

54 a break in the communication between the teacher station and the server computer and resending

55 any test data that was not sent due to the communications break.

56   276.   The method of Claim 273, wherein each student computer further comprises

57 connecting to the server computer and downloading the resources necessary to execute the

58 current test when the test is started.

59   277.   The method of Claim 273, wherein the teacher station further comprises

60 generating a classroom layout showing an icon for each student computer.

61   278.   The method of Claim 277, wherein the teacher station further comprises

62 monitoring each student's test progress and controlling each student computer.

63   279.   The method of Claim 277, wherein the teacher station further comprises

64 collecting student test data.

65   280.   The method of Claim 277, wherein generating the layout further comprises

66 coloring each icon depending on the state of testing for the particular student computer.

67   281.   The method of Claim 273, wherein the teacher station further comprises

68 generating one or more separate accounts for the diagnostic system, wherein the accounts include

69 an account manager for managing an entire school or district of users of the diagnostic system, a

70 lead teacher for managing the use of the diagnostic system by one or more classroom teachers in

71 a particular school and one or more classroom teachers who each administer the diagnostic

72 testing for a particular class of students.

73   282.   The method of Claim 281, wherein the teacher station further comprises a user

74 interface for the account manager to register one or more lead teachers and a user interface for

75 each lead teacher to register one or more classroom teachers who administer the test.

76   283.   The method of Claim 282, wherein the account manager has access to testing data

77   for the entire district, wherein the lead teacher has access to testing data for the entire school and

78   each classroom teacher has access to testing data for the class of the classroom teacher.

79

80   284.   A server for testing one or more skills associated with the reading skills of an

81   individual, comprising:

82   one or more tests for determining deficiencies in one or more reading and pre-reading

83   skills;

84   a scorer for determining a score for each test; and

85   means for establishing a communications session with a client computer to download the

86   one or more tests to the client computer wherein each client computer displays at least one of a

87   graphical image and audio associated with each test located on the server, receiving a user

88   response to one of the graphical images and audio presented by each test and communicates the

89   responses for each test back to the server computer;

90   a recommender for recommending, based on the scores of the one or more tests, one or

91   more training modules for improving a reading or pre-reading skill of the individual as indicated

92   by the score of the tests.

93   285.   The server of Claim 284 further comprising a client computer, wherein each client

94   computer further comprises means for motivating the user to complete the tests.

95   286.   The server of Claim 284 further comprising a questionnaire having one or more

96   questions for eliciting information about risk factors associated with language-based learning

97   disabilities.

1   287.   The server of Claim 286, wherein the information comprises historical data about

2   reading-related risk factors including one or more of medical conditions including chronic otitis

3   media, family history data including history of dyslexia, environmental data including

4   socioeconomic status and exposure to literacy at home and observational data about an

5   individual's behaviors reflecting competencies in speech sound awareness.

1   288.   The server of Claim 285, wherein the user input device of the one or more client
2   computers comprise a speech recognition device for receiving a verbal response from the user to
3   the one or more tests.

1   289.   The server of Claim 284, wherein the one or more tests comprise a rhyme
2   recognition test for testing the ability to recognize rhymes, a rhyme generation test for testing the
3   ability to generate rhymes, a beginning and ending sound recognizer for testing the ability to
4   recognize the beginning and ending sounds of a word, a word decoder test for testing the ability
5   to read by sounding out a written word, a sound blender test for testing the ability to blend sound
6   units together to form words, a sound segmenting test for testing the ability to segment a sound
7   unit into smaller sound units, a sound manipulator test for testing the ability to manipulate sound
8   units to form a new unit, a sequential verbal recall test for testing the ability to recall a sequence
9   of spoken items, a rapid naming test for testing the ability to rapidly name one or more items, a
10   letter naming and symbol/sound association test for testing the ability to name letters and identify
11   the association between a symbol and an associated sound, and a fluent reader test for testing the
12   ability to read fluently.

1   290.   The server of Claim 284, wherein the tests further comprise a rhyme recognition
2   test further comprising means for providing at least two stimuli to the user and means for
3   receiving user input in response to the at least two stimuli to determine the user's ability to
4   recognize rhyming words.

1   291.   The server of Claim 284, wherein the tests further comprise a test for recognizing
2   the beginning sound of a stimulus, the test comprising means for generating at least one stimulus
3   having at least an initial phoneme and means for receiving a response to the stimulus that
4   indicates an ability of the test taker to recognize the initial phoneme of the stimulus.

1   292.   The server of Claim 284, wherein the tests further comprise a test for recognizing
2   the ending sound of a stimulus, the test comprising means for generating at least one stimulus

3   having at least an ending phoneme and means for receiving a response to the stimulus that

4   indicates an ability of the test taker to recognize the ending phoneme of the stimulus.

1   293.   The server of Claim 284, wherein the tests further comprise a rhyme generation

2   test comprising means for generating a stimulus and means for receiving a response from the

3   user identifying a sound unit that rhymes with the stimulus.

4

1   294.   The server of Claim 284, wherein the tests further comprise a sound blender test

2   comprising means for generating at least two sound stimuli and means for receiving a user

3   response to the at least two sound stimuli, the response indicating an ability to blend the at least

4   two sound stimuli into a larger sound unit.

1   295.   The server of Claim 284, wherein the tests further comprise a sound segmentation

2   test comprising means for generating at least one stimulus and means for receiving a response to

3   the stimulus comprising means for segmenting the stimulus into smaller units in order to test the

4   ability to segment the stimulus into smaller units.

1   296.   The server of Claim 284, wherein the tests comprise a sound manipulation test

2   comprising means for generating a sound stimulus having one or more sound units and means, in

3   response to the sound stimulus, for manipulating the sound units of the sound stimulus to test the

4   ability to manipulate sound units.

1   297.   The server of Claim 284, wherein the tests further comprise a verbal recall test

2   comprising means for generating at least one sound stimulus and means, in response to the at

3   least one sound stimulus, for receiving a user response indicating the recalling of the at least one

4   sound stimulus.

1   298.   The server of Claim 288 further comprising means for speaking a verbal response

2   into the speech recognition device for receiving a verbal response from the user.

1   299.   The server of Claim 284, wherein the tests further comprise a naming test
2 comprising means for generating at least one visual stimulus and means, in response to the
3 display of the visual stimulus, for speaking the name of or the sound associated with the visual
4 stimulus using the speech recognition device.

1   300.   The server of Claim 284, wherein the tests further comprise a word decoder test
2 comprising means for displaying a visual stimulus to the user and means, in response to the
3 visual stimulus, for receiving a response from the user to determine the ability to read the visual
4 stimulus.

1   301.   The server of Claim 284, wherein the tests further comprise a fluency test
2 comprising means for generating a plurality of visual stimuli and means for receiving a user's
3 response to the visual stimuli within a predetermined time interval to determine the user's ability
4 to read and understand the visual stimuli.
5

6   302.   The server of Claim 285, wherein the motivation means further comprises means
7 for generating a graphical image and an associated sound to motivate the user to complete the
8 tests.

1   303.   The server of Claim 302, wherein the motivation means further comprises means
2 for generating the graphical image and associated sound after a first predetermined number of
3 tests are completed and means for generating another graphical image and associated sound after
4 a second predetermined number of tests are completed.

5   304.   The server of Claim 303, wherein the generating means further comprises means
6 for generating a graphical image indicating the number of tests remaining to be completed.

7   305.   The server of Claim 303, wherein the motivation means further comprises means
8 for generating the graphical image and associated sound after a third predetermined number of
9 tests.

10   306.   The server of Claim 284, wherein the recommender further comprises means for
11 downloading the recommended training module to the client computer.

12   307.   The server of Claim 284, wherein the recommender further comprises means for

13   storing the incorrect responses to the one or more tests and means for generating a training

14   module recommendation based on the incorrect responses.

15   308.   The server of Claim 307, wherein the recommender further comprises means for

16   comparing each incorrect response to one or more error measures to identify an error associated

17   with each incorrect response and means for generating a training module recommendation based

18   on the identified error.

19   309.   The server of Claim 308, wherein the comparing means further comprises means

20   for identifying one or more errors for each incorrect response.

21   310.   The server of Claim 308, wherein the recommender further comprises means for

22   identifying a deficient skill by comparing the identified error to a deficient skill rule and means

23   for generating a training module recommendation based on the identified deficient skill.

24   311.   The server of Claim 284 further comprising means for dynamically generating

25   one or more data reports that illustrate the data associated with the one or more tests.

26   312.   The server of Claim 311, wherein the data reports further comprises means for

27   displaying the test results simultaneously for one or more students.

28   313.   The server of Claim 312, wherein the displaying means further comprises means

29   for displaying the percentage of correct responses for a test.

30   314.   The server of Claim 312, wherein the displaying means further comprises means

31   for displaying the results for one or more different tests for each user wherein the results for each

32   test are displayed in a different color.

33   315.   The server of Claim 311, wherein the data report generator further comprises a

34   user interface for browsing other test data for a user.

35   316.   The server of Claim 311, wherein the data report generator further comprises

36   means for determining the number of user test results shown.

37   317.   The server of Claim 311, wherein the data report generator further comprises

38   means for permitting the user to select a data report print format.

39   318.   The server of Claim 311, wherein the data report generator further comprises

40   means for permitting the user to select a data report display format.

41   319.   The server of Claim 311, wherein the data report generator further comprises

42   means for generating a data report for one or more students in a class, means for generating a

43   data report for one or more classes each having one or more students and means for generating a

44   data report for a school having one or more classes.

45   320.   The server of Claim 285 further comprising a teacher station that downloads the

46   tests from the server and one or more student computers connected to the teacher station by a

47   network, each student computer further comprising means for displaying at least one of a

48   graphical image and audio associated with each test located on the server, means for receiving a

49   user response to one of the graphical images and audio presented by each test and means for

50   communicating the responses for each test back to the teacher station.

51   321.   The server of Claim 320, wherein the teacher station further comprises means for

52   communicating the response for each test for each student back to the server computer.

53   322.   The server of Claim 321, wherein the teacher station further comprises means for

54   detecting a break in the communication between the teacher station and the server computer and

55   means for resending any test data that was not sent due to the communications break.

56   323.   The server of Claim 320, wherein each student computer further comprises means

57   for connecting to the server computer and means for downloading the resources necessary to

58   execute the current test when the test is started.

59   324.   The server of Claim 320, wherein the teacher station further comprises means for

60   controlling each student computer.

61   325.   The server of Claim 320, wherein the teacher station further comprises means for

62   generating a classroom layout showing an icon for each student computer.

63   326.   The server of Claim 325, wherein the teacher station further comprises means for

64   monitoring each student's test progress and controlling each student computer.

65   327.   The server of Claim 325, wherein the teacher station further comprises means for

66   collecting student test data.

67   328.   The server of Claim 325, wherein generating the layout further comprises means

68   for coloring each icon depending on the state of testing for the particular student computer.

69   329.   The server of Claim 284, wherein the teacher station further comprises means for

70   generating one or more separate accounts for the diagnostic system, wherein the accounts include

71   an account manager for managing an entire school or district of users of the diagnostic system, a

72   lead teacher for managing the use of the diagnostic system by one or more classroom teachers in

73   a particular school and one or more classroom teachers who each administer the diagnostic

74   testing for a particular class of students.

75   330.   The server of Claim 329, wherein the teacher station further comprises means for

76   the account manager to register one or more lead teachers and means for each lead teacher to

77   register one or more classroom teachers who administer the test.

78   331.   The server of Claim 330, wherein the account manager has access to testing data

79   for the entire district, wherein the lead teacher has access to testing data for the entire school and

80   each classroom teacher has access to testing data for the class of the classroom teacher.

81

82   332.   A system for recommending a training module based on one or more tests,

83   comprising:

means for determining the incorrect responses to one or more tests wherein the incorrect

responses indicate a reading skill deficiency; and

means for recommending a training module that improves a particular reading skill based

on the incorrect responses.

84   333.   The system of Claim 332, wherein the recommender further comprises means for

85   comparing each incorrect response to one or more error measures to generate an error measure

86   associated with each incorrect response and means for generating a training module

87   recommendation based on the error measures.

88   334.   The system of Claim 333, wherein the comparing means further comprises means

89   for generating one or more error measures for each incorrect response.

90   335.   The system of Claim 333, wherein the recommender further comprises means for

91   identifying a deficient skill by comparing the error measure to a deficient skill rule and means for

92   generating a training module recommendation based on the identified deficient skill.

93

93   336.   A method for recommending a training module based on one or more tests,

94   comprising:

  determining the incorrect responses to one or more tests wherein the incorrect responses

indicate a reading skill deficiency; and

  recommending a training module that improves a particular reading skill based on the

incorrect responses.

95   337.   The method of Claim 336, wherein the recommender further comprises

96   comparing each incorrect response to one or more error measures to generate an error measure

97   associated with each incorrect response and generating a training module recommendation based

98   on the error measures.

99   338.   The method of Claim 337, wherein the comparing further comprises generating

100 one or more error measures for each incorrect response.

101   The method of Claim 337, wherein the recommender further comprises identifying a

102 deficient skill by comparing the error measure to a deficient skill rule and generating a training

103 module recommendation based on the identified deficient skill.

104   339.   The system of Claim F, wherein each client computer further comprises means for

105 motivating the user to complete the tests.

106

106   340.   A system for testing one or more skills associated with the reading skills of an

107   individual, comprising:

108   a server computer comprising one or more tests for determining deficiencies in one or

109   more reading and pre-reading skills, a scorer for determining a score for each test;

110   a teacher station for downloading the tests from the server computer; and

111   one or more student computers that establish a communications session with the teacher

112   station over a computer network, each student computer comprising means for displaying at least

113   one of a graphical image and audio associated with each test located on the server, means for

114   receiving a user response to one of the graphical images and audio presented by each test, and

115   means for communicating the responses for each test back to the server computer.

116   341.   The system of Claim 340, wherein each client computer further comprises means

117   for motivating the user to complete the tests.

118   342.   The system of Claim 340, wherein the server further comprises a questionnaire

119   having one or more questions for eliciting information about risk factors associated with

120   language-based learning disabilities.

121

1   343.   The system of Claim 342, wherein the information comprises historical data about

2   reading-related risk factors including one or more of medical conditions including chronic otitis

3   media, family history data including history of dyslexia, environmental data including

4   socioeconomic status and exposure to literacy at home and observational data about an

5   individual's behaviors reflecting competencies in speech sound awareness.

6

1   344.   The system of Claim 340, wherein the user input device of the one or more client

2   computers comprise a speech recognition device for receiving a verbal response from the user to

3   the one or more tests.

1   345.   The system of Claim 340, wherein the one or more tests comprise a rhyme

2   recognition test for testing the ability to recognize rhymes, a rhyme generation test for testing the

3   ability to generate rhymes, a beginning and ending sound recognizer for testing the ability to

4   recognize the beginning and ending sounds of a word, a word decoder test for testing the ability

5   to read by sounding out a written word, a sound blender test for testing the ability to blend sound

6   units together to form words, a sound segmenting test for testing the ability to segment a sound

7   unit into smaller sound units, a sound manipulator test for testing the ability to manipulate sound

8   units to form a new unit, a sequential verbal recall test for testing the ability to recall a sequence

9   of spoken items, a rapid naming test for testing the ability to rapidly name one or more items, a

10   letter naming and symbol/sound association test for testing the ability to name letters and identify

11   the association between a symbol and an associated sound, and a fluent reader test for testing the

12   ability to read fluently.

1   346.   The system of Claim 340, wherein the tests further comprise a rhyme recognition

2   test further comprising means for providing at least two stimuli to the user and means for

3   receiving user input in response to the at least two stimuli to determine the user's ability to

4   recognize rhyming words.

1   347.   The system of Claim 340, wherein the tests further comprise a test for recognizing

2   the beginning sound of a stimulus, the test comprising means for generating at least one stimulus

3   having at least an initial phoneme and means for receiving a response to the stimulus that

4   indicates an ability of the test taker to recognize the initial phoneme of the stimulus.

1   348.   The system of Claim 340, wherein the tests further comprise a test for recognizing

2   the ending sound of a stimulus, the test comprising means for generating at least one stimulus

3   having at least an ending phoneme and means for receiving a response to the stimulus that

4   indicates an ability of the test taker to recognize the ending phoneme of the stimulus.

1   349.   The system of Claim 340, wherein the tests further comprise a rhyme generation

2   test comprising means for generating a stimulus and means for receiving a response from the

3   user identifying a sound unit that rhymes with the stimulus.

1   350.   The system of Claim 340, wherein the tests further comprise a sound blender test

2   comprising means for generating at least two sound stimuli and means for receiving a user

3   response to the at least two sound stimuli, the response indicating an ability to blend the at least

4   two sound stimuli into a larger sound unit.

1   351.   The system of Claim 340, wherein the tests further comprise a sound

2   segmentation test comprising means for generating at least one stimulus and means for receiving

3   a response to the stimulus comprising means for segmenting the stimulus into smaller units in

4   order to test the ability to segment the stimulus into smaller units.

1   352.   The system of Claim 340, wherein the tests comprise a sound manipulation test

2   comprising means for generating a sound stimulus having one or more sound units and means, in

3   response to the sound stimulus, for manipulating the sound units of the sound stimulus to test the

4   ability to manipulate sound units.

1   353.   The system of Claim 340, wherein the tests further comprise a verbal recall test

2   comprising means for generating at least one sound stimulus and means, in response to the at

3   least one sound stimulus, for receiving a user response indicating the recalling of the at least one

4   sound stimulus.

1   354.   The system of Claim 344 further comprising means for speaking a verbal

2   response into the speech recognition device for receiving a verbal response from the user.

1   355.   The system of Claim 340, wherein the tests further comprise a naming test

2   comprising means for generating at least one visual stimulus and means, in response to the

3   display of the visual stimulus, for speaking the name of or the sound associated with the visual

4   stimulus using the speech recognition device.

1   356.   The system of Claim 340, wherein the tests further comprise a word decoder test

2   comprising means for displaying a visual stimulus to the user and means, in response to the

3   visual stimulus, for receiving a response from the user to determine the ability to read the visual

4   stimulus.

1   357.   The system of Claim 340, wherein the tests further comprise a fluency test

2   comprising means for generating a plurality of visual stimuli and means for receiving a user's

3   response to the visual stimuli within a predetermined time interval to determine the user's ability

4   to read and understand the visual stimuli.

5

6   358.   The system of Claim 341, wherein the motivation means further comprises means

7   for generating a graphical image and an associated sound to motivate the user to complete the

8   tests.

1   359.   The system of Claim 358, wherein the motivation means further comprises means

2   for generating the graphical image and associated sound after a first predetermined number of

3   tests are completed and means for generating another graphical image and associated sound after

4   a second predetermined number of tests are completed.

5   360.   The system of Claim 359, wherein the generating means further comprises means

6   for generating a graphical image indicating the number of tests remaining to be completed.

7   361.   The system of Claim 359, wherein the motivation means further comprises means

8   for generating the graphical image and associated sound after a third predetermined number of

9   tests.

10

11   362.   The system of 340 her comprising a recommender for recommending, based on

12   the scores of the one or more tests, one or more training modules for improving a reading or pre-

13   reading skill of the individual as indicated by the score of the tests.

14

15   363.   The system of Claim 362, wherein the recommender further comprises means for

16   downloading the recommended training module to the student computer.

17   364.   The system of Claim 362, wherein the recommender further comprises means for

18   storing the incorrect responses to the one or more tests and means for generating a training

19   module recommendation based on the incorrect responses.

20   365.   The system of Claim 364, wherein the recommender further comprises means for

21   comparing each incorrect response to one or more error measures to identify an error associated

22   with each incorrect response and means for generating a training module recommendation based

23   on the identified error.

24   366.   The system of Claim 365, wherein the comparing means further comprises means

25   for identifying one or more errors for each incorrect response.

26   367.   The system of Claim 365, wherein the recommender further comprises means for

27   identifying a deficient skill by comparing the identified error to a deficient skill rule and means

28   for generating a training module recommendation based on the identified deficient skill.

29   368.   The system of 340, wherein the server further comprises means for dynamically

30   generating one or more data reports that illustrate the data associated with the one or more tests.

31   369.   The system of Claim 368, wherein the data reports further comprises means for

32   displaying the test results simultaneously for one or more students.

33   370.   The system of Claim 369, wherein the displaying means further comprises means

34   for displaying the percentage of correct responses for a test.

35   371.   The system of Claim 369, wherein the displaying means further comprises means

36   for displaying the results for one or more different tests for each user wherein the results for each

37   test are displayed in a different color.

38   372.   The system of Claim 368, wherein the data report generator further comprises a

39   user interface for browsing other test data for a user.

40   373.   The system of Claim 368, wherein the data report generator further comprises

41   means for determining the number of user test results shown.

42   374.   The system of Claim 368, wherein the data report generator further comprises

43   means for permitting the user to select a data report print format.

44   375.   The system of Claim 368, wherein the data report generator further comprises

45   means for permitting the user to select a data report display format.

46   376.   The system of Claim 368, wherein the data report generator further comprises

47   means for generating a data report for one or more students in a class, means for generating a

48   data report for one or more classes each having one or more students and means for generating a

49   data report for a school having one or more classes.

50   377.   The system of Claim 340, wherein the teacher station further comprises means for

51   communicating the response for each test for each student back to the server computer.

52   378.   The system of Claim 377, wherein the teacher station further comprises means for

53   detecting a break in the communication between the teacher station and the server computer and

54   means for resending any test data that was not sent due to the communications break.

55   379.   The system of Claim 340, wherein each student computer further comprises

56   means for connecting to the server computer and means for downloading the resources necessary

57   to execute the current test when the test is started.

58   380.   The system of Claim 340, wherein the teacher station further comprises means for

59   generating a classroom layout showing an icon for each student computer.

60   381.   The system of Claim 380, wherein the teacher station further comprises means for

61   monitoring each student's test progress and controlling each student computer.

62   382.   The system of Claim 380, wherein the teacher station further comprises means for

63   collecting student test data.

64   383.   The system of Claim 380, wherein generating the layout further comprises means

65   for coloring each icon depending on the state of testing for the particular student computer.

66   384.   The system of Claim F, wherein the teacher station further comprises means for

67   generating one or more separate accounts for the diagnostic system, wherein the accounts include

68   an account manager for managing an entire school or district of users of the diagnostic system, a

69   lead teacher for managing the use of the diagnostic system by one or more classroom teachers in

70   a particular school and one or more classroom teachers who each administer the diagnostic

71   testing for a particular class of students.

72   385.   The system of Claim F+40, wherein the teacher station further comprises means

73   for the account manager to register one or more lead teachers and means for each lead teacher to

74   register one or more classroom teachers who administer the test.

75   386.   The system of Claim F+41, wherein the account manager has access to testing

76   data for the entire district, wherein the lead teacher has access to testing data for the entire school

77   and each classroom teacher has access to testing data for the class of the classroom teacher.

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79   387.   A method for testing one or more skills associated with the reading skills of an

80   individual, comprising:

81   storing instructions corresponding to one or more tests on a server for determining

82   deficiencies in one or more reading and pre-reading skills and a scorer for determining a score

83   for each test;

84   downloading the one or more tests from the server computer to a teacher station;

85   displaying at least one of a graphical image and audio associated with each test located

86   on the server at the client computer connected to the teacher station;

87   receiving a user response to one of the graphical images and audio presented by each test

88   at the client computer connected to the teacher station;

89   communicating the responses for each test back to the teacher station; and

1   388.   The method of Claim F further comprising motivating the user to complete the

2   tests.

3   389.   The method of Claim F further comprising generating a questionnaire having one

4   or more questions for eliciting information about risk factors associated with language-based

5   learning disabilities.

1   390.   The method of Claim F+2, wherein the information comprises historical data

2   about reading-related risk factors including one or more of medical conditions including chronic

3   otitis media, family history data including history of dyslexia, environmental data including

4   socioeconomic status and exposure to literacy at home and observational data about an

5   individual's behaviors reflecting competencies in speech sound awareness.

1   391.   The method of Claim F further comprising receiving a verbal response from a

2   user to one or more tests using a speech recognition device.

1   392.   The method of Claim F, wherein the one or more tests comprise a rhyme

2   recognition test for testing the ability to recognize rhymes, a rhyme generation test for testing the

3   ability to generate rhymes, a beginning and ending sound recognizer for testing the ability to

4   recognize the beginning and ending sounds of a word, a word decoder test for testing the ability

5   to read by sounding out a written word, a sound blender test for testing the ability to blend sound

6   units together to form words, a sound segmenting test for testing the ability to segment a sound

7   unit into smaller sound units, a sound manipulator test for testing the ability to manipulate sound

8   units to form a new unit, a sequential verbal recall test for testing the ability to recall a sequence

9   of spoken items, a rapid naming test for testing the ability to rapidly name one or more items, a

10   letter naming and symbol/sound association test for testing the ability to name letters and identify

11   the association between a symbol and an associated sound, and a fluent reader test for testing the

12   ability to read fluently.

1   393.   The method of Claim F, wherein the tests further comprise a rhyme recognition

2   test further comprising providing at least two stimuli to the user and receiving user input in

3   response to the at least two stimuli to determine the user's ability to recognize rhyming words.

1   394.   The method of Claim F, wherein the tests further comprise a test for recognizing

2   the beginning sound of a stimulus, the test comprising generating at least one stimulus having at

3   least an initial phoneme and receiving a response to the stimulus that indicates an ability of the

4   test taker to recognize the initial phoneme of the stimulus.

1   395.   The method of Claim F, wherein the tests further comprise a test for recognizing

2   the ending sound of a stimulus, the test comprising generating at least one stimulus having at

3   least an ending phoneme and receiving a response to the stimulus that indicates an ability of the

4   test taker to recognize the ending phoneme of the stimulus.

1   396.   The method of Claim F, wherein the tests further comprise a rhyme generation

2   test comprising generating a stimulus and receiving a response from the user identifying a sound

3   unit that rhymes with the stimulus.

1   397.   The method of Claim F, wherein the tests further comprise a sound blender test

2   comprising generating at least two sound stimuli and receiving a user response to the at least two

3   sound stimuli, the response indicating an ability to blend the at least two sound stimuli into a

4   larger sound unit.

1   398.   The method of Claim F, wherein the tests further comprise a sound segmentation

2   test comprising generating at least one stimulus and receiving a response to the stimulus

3   comprising means for segmenting the stimulus into smaller units in order to test the ability to

4   segment the stimulus into smaller units.

1   399.   The method of Claim F, wherein the tests comprise a sound manipulation test

2   comprising generating a sound stimulus having one or more sound units and, in response to the

3   sound stimulus, manipulating the sound units of the sound stimulus to test the ability to

4   manipulate sound units.

1   400.   The method of Claim F, wherein the tests further comprise a verbal recall test

2   comprising generating at least one sound stimulus and, in response to the at least one sound

3   stimulus, receiving a user response indicating the recalling of the at least one sound stimulus.

1   401.   The method of Claim F+4 further comprising speaking a verbal response into the

2   speech recognition device for receiving a verbal response from the user.

1   402.   The method of Claim F, wherein the tests further comprise a naming test

2   comprising generating at least one visual stimulus and, in response to the display of the visual

3   stimulus, speaking the name of or the sound associated with the visual stimulus using the speech

4   recognition device.

1   403.   The method of Claim F, wherein the tests further comprise a word decoder test

2   comprising displaying a visual stimulus to the user and, in response to the visual stimulus,

3   receiving a response from the user to determine the ability to read the visual stimulus.

1   404.   The method of Claim F, wherein the tests further comprise a fluency test

2   comprising generating a plurality of visual stimuli and receiving a user's response to the visual

3   stimuli within a predetermined time interval to determine the user's ability to read and

4   understand the visual stimuli.

5   405.   The method of Claim F, wherein the motivation further comprises generating a

6   graphical image and an associated sound to motivate the user to complete the tests.

1   406.   The method of Claim F+19, wherein the motivation further comprises generating

2   the graphical image and associated sound after a first predetermined number of tests are

3   completed and generating another graphical image and associated sound after a second

4   predetermined number of tests are completed.

5   407.   The method of Claim F+20, wherein the generating further comprises generating

6   a graphical image indicating the number of tests remaining to be completed.

7   408.   The method of Claim F+20, wherein the motivation further comprises generating

8   the graphical image and associated sound after a third predetermined number of tests.

9   409.   The method of Claim F further compring, based on the test scores, recommending

10   a training module to improve the skill of a user.

11   410.   The method of Claim F+1, wherein the recommender further comprises

12   downloading the recommended training module to the client computer.

13   411.   The method of Claim F+1, wherein the recommender further comprises storing

14   the incorrect responses to the one or more tests and generating a training module

15   recommendation based on the incorrect responses.

16   412.   The method of Claim F+23, wherein the recommender further comprises

17   comparing each incorrect response to one or more error measures to identify an error associated

18   with each incorrect response and generating a training module recommendation based on the

19   identified error.

20   413.   The method of Claim F+24, wherein the comparing further comprises identifying

21   one or more errors for each incorrect response.

22   414.   The method of Claim F+24, wherein the recommender further comprises

23   identifying a deficient skill by comparing the identified error to a deficient skill rule and

24   generating a training module recommendation based on the identified deficient skill.

25   415.   The method of Claim F further comprising dynamically generating one or more

26   data reports that illustrate the data associated with the one or more tests.

27   416.   The method of Claim F+27, wherein the data reports further comprises displaying

28   the test results simultaneously for one or more students.

29   417.   The method of Claim F+28, wherein the displaying further comprises displaying

30   the percentage of correct responses for a test.

31   418.   The method of Claim F+28, wherein the displaying further comprises displaying

32   the results for one or more different tests for each user wherein the results for each test are

33   displayed in a different color.

34   419.   The method of Claim F+27, wherein the data report generator further comprises a

35   user interface for browsing other test data for a user.

36   420.   The method of Claim F+27, wherein the data report generator further comprises

37   determining the number of user test results shown.

38   421.   The method of Claim F+27, wherein the data report generator further comprises

39   permitting the user to select a data report print format.

40   422.   The method of Claim F+27, wherein the data report generator further comprises

41   permitting the user to select a data report display format.

42   423.   The method of Claim F+27, wherein the data report generator further comprises

43   generating a data report for one or more students in a class, generating a data report for one or

44   more classes each having one or more students and generating a data report for a school having

45   one or more classes.

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47   424.   The method of Claim F, wherein the client computer further comprises a teacher

48   station that downloads the tests from the server and one or more student computers connected to

49   the teacher station by a network, each student computer further comprising displaying at least

50   one of a graphical image and audio associated with each test located on the server, receiving a

51   user response to one of the graphical images and audio presented by each test and

52   communicating the responses for each test back to the teacher station.

53   425.   The method of Claim F+33, wherein the teacher station further comprises

54   communicating the response for each test for each student back to the server computer.

55   426.   The method of Claim F+34, wherein the teacher station further comprises

56   detecting a break in the communication between the teacher station and the server computer and

57   resending any test data that was not sent due to the communications break.

58   427.   The method of Claim F+33, wherein each student computer further comprises

59   connecting to the server computer and downloading the resources necessary to execute the

60   current test when the test is started.

61   428.   The method of Claim F+33, wherein the teacher station further comprises

62   generating a classroom layout showing an icon for each student computer.

63   429.   The method of Claim 428, wherein the teacher station further comprises

64   monitoring each student's test progress and controlling each student computer.

65   430.   The method of Claim 428, wherein the teacher station further comprises

66   collecting student test data.

67   431.   The method of Claim 428, wherein generating the layout further comprises

68   coloring each icon depending on the state of testing for the particular student computer.

69   432.   The method of Claim 424, wherein the teacher station further comprises

70   generating one or more separate accounts for the diagnostic system, wherein the accounts include

71   an account manager for managing an entire school or district of users of the diagnostic system, a

72   lead teacher for managing the use of the diagnostic system by one or more classroom teachers in

73   a particular school and one or more classroom teachers who each administer the diagnostic

74   testing for a particular class of students.

75   433.   The method of Claim 432, wherein the teacher station further comprises a user

76   interface for the account manager to register one or more lead teachers and a user interface for

77   each lead teacher to register one or more classroom teachers who administer the test.

78   434.   The method of Claim 433, wherein the account manager has access to testing data

79   for the entire district, wherein the lead teacher has access to testing data for the entire school and

80   each classroom teacher has access to testing data for the class of the classroom teacher.

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82   435.   A dual server system for testing one or more skills associated with the reading

83   skills of an individual, comprising:

84   a server computer comprising one or more tests for determining deficiencies in one or

85   more reading and pre-reading skills, a scorer for determining a score for each test;

86   a teacher station for downloading the tests from the server computer; and

87   wherein the teacher station is connected to one or more student computer over a computer

88   network, the teacher station further comprising means for establishing a communications session

89   with each student computer so that each student computer displays at least one of a graphical

90   image and audio associated with each test located on the server, receives a user response to one

91   of the graphical images and audio presented by each test, and communicates the responses for

92   each test back to the teacher station.

93

94   436.   The system of Claim 435, wherein each client computer further comprises means

95   for motivating the user to complete the tests.

96   437.   The system of Claim 435, wherein the server further comprises a questionnaire

97   having one or more questions for eliciting information about risk factors associated with

98   language-based learning disabilities.

1   438.   The system of Claim 437, wherein the information comprises historical data about

2   reading-related risk factors including one or more of medical conditions including chronic otitis

3   media, family history data including history of dyslexia, environmental data including

4   socioeconomic status and exposure to literacy at home and observational data about an

5   individual's behaviors reflecting competencies in speech sound awareness.

1   439.   The system of Claim 435, wherein the user input device of the one or more client

2   computers comprise a speech recognition device for receiving a verbal response from the user to

3   the one or more tests.

1   440.   The system of Claim 435, wherein the one or more tests comprise a rhyme

2   recognition test for testing the ability to recognize rhymes, a rhyme generation test for testing the

3   ability to generate rhymes, a beginning and ending sound recognizer for testing the ability to

4   recognize the beginning and ending sounds of a word, a word decoder test for testing the ability

5   to read by sounding out a written word, a sound blender test for testing the ability to blend sound

6   units together to form words, a sound segmenting test for testing the ability to segment a sound

7   unit into smaller sound units, a sound manipulator test for testing the ability to manipulate sound

8   units to form a new unit, a sequential verbal recall test for testing the ability to recall a sequence

9   of spoken items, a rapid naming test for testing the ability to rapidly name one or more items, a

10   letter naming and symbol/sound association test for testing the ability to name letters and identify

11   the association between a symbol and an associated sound, and a fluent reader test for testing the

12   ability to read fluently.

1   441.   The system of Claim 435, wherein the tests further comprise a rhyme recognition

2   test further comprising means for providing at least two stimuli to the user and means for

3   receiving user input in response to the at least two stimuli to determine the user's ability to

4   recognize rhyming words.

1   442.   The system of Claim 435, wherein the tests further comprise a test for recognizing

2   the beginning sound of a stimulus, the test comprising means for generating at least one stimulus

3   having at least an initial phoneme and means for receiving a response to the stimulus that

4   indicates an ability of the test taker to recognize the initial phoneme of the stimulus.

1   443.   The system of Claim 435, wherein the tests further comprise a test for recognizing

2   the ending sound of a stimulus, the test comprising means for generating at least one stimulus

3   having at least an ending phoneme and means for receiving a response to the stimulus that

4   indicates an ability of the test taker to recognize the ending phoneme of the stimulus.

1   444.   The system of Claim 435, wherein the tests further comprise a rhyme generation

2   test comprising means for generating a stimulus and means for receiving a response from the

3   user identifying a sound unit that rhymes with the stimulus.

1   445.   The system of Claim 435, wherein the tests further comprise a sound blender test

2   comprising means for generating at least two sound stimuli and means for receiving a user

3   response to the at least two sound stimuli, the response indicating an ability to blend the at least

4   two sound stimuli into a larger sound unit.

1   446.   The system of Claim 435, wherein the tests further comprise a sound

2   segmentation test comprising means for generating at least one stimulus and means for receiving

3   a response to the stimulus comprising means for segmenting the stimulus into smaller units in

4   order to test the ability to segment the stimulus into smaller units.

1   447.   The system of Claim 435, wherein the tests comprise a sound manipulation test

2   comprising means for generating a sound stimulus having one or more sound units and means, in

3   response to the sound stimulus, for manipulating the sound units of the sound stimulus to test the

4   ability to manipulate sound units.

1   448.   The system of Claim 435, wherein the tests further comprise a verbal recall test

2   comprising means for generating at least one sound stimulus and means, in response to the at

3   least one sound stimulus, for receiving a user response indicating the recalling of the at least one

4   sound stimulus.

1   449.   The system of Claim 439 further comprising means for speaking a verbal

2   response into the speech recognition device for receiving a verbal response from the user.

1   450.   The system of Claim 435, wherein the tests further comprise a naming test

2   comprising means for generating at least one visual stimulus and means, in response to the

3   display of the visual stimulus, for speaking the name of or the sound associated with the visual

4   stimulus using the speech recognition device.

1   451.   The system of Claim 435, wherein the tests further comprise a word decoder test

2   comprising means for displaying a visual stimulus to the user and means, in response to the

3   visual stimulus, for receiving a response from the user to determine the ability to read the visual

4   stimulus.

1   452.   The system of Claim 435, wherein the tests further comprise a fluency test

2   comprising means for generating a plurality of visual stimuli and means for receiving a user's

3   response to the visual stimuli within a predetermined time interval to determine the user's ability

4   to read and understand the visual stimuli.

5

6   453.   The system of Claim 436, wherein the motivation means further comprises means

7   for generating a graphical image and an associated sound to motivate the user to complete the

8   tests.

1   454.   The system of Claim 453, wherein the motivation means further comprises means

2   for generating the graphical image and associated sound after a first predetermined number of

3   tests are completed and means for generating another graphical image and associated sound after

4   a second predetermined number of tests are completed.

5   455.   The system of Claim 454, wherein the generating means further comprises means

6   for generating a graphical image indicating the number of tests remaining to be completed.

7   456.   The system of Claim 454, wherein the motivation means further comprises means

8   for generating the graphical image and associated sound after a third predetermined number of

9   tests.

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11   457.   The system of Claim 435 further comprising a recommender for recommending,

12   based on the scores of the one or more tests, one or more training modules for improving a

13   reading or pre-reading skill of the individual as indicated by the score of the tests.

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15 458. The system of Claim 457, wherein the recommender further comprises means for
16 downloading the recommended training module to the student computer.

17 459. The system of Claim 457, wherein the recommender further comprises means for
18 storing the incorrect responses to the one or more tests and means for generating a training
19 module recommendation based on the incorrect responses.

20 460. The system of Claim 459, wherein the recommender further comprises means for
21 comparing each incorrect response to one or more error measures to identify an error associated
22 with each incorrect response and means for generating a training module recommendation based
23 on the identified error.

24 461. The system of Claim 460, wherein the comparing means further comprises means
25 for identifying one or more errors for each incorrect response.

26 462. The system of Claim 460 wherein the recommender further comprises means for
27 identifying a deficient skill by comparing the identified error to a deficient skill rule and means
28 for generating a training module recommendation based on the identified deficient skill.

29 463. The system of Claim 435, wherein the server further comprises means for
30 dynamically generating one or more data reports that illustrate the data associated with the one or
31 more tests.

32 464. The system of Claim 463, wherein the data reports further comprises means for
33 displaying the test results simultaneously for one or more students.

34 465. The system of Claim 464, wherein the displaying means further comprises means
35 for displaying the percentage of correct responses for a test.

36 466. The system of Claim 464, wherein the displaying means further comprises means
37 for displaying the results for one or more different tests for each user wherein the results for each
38 test are displayed in a different color.

39 467. The system of Claim 463, wherein the data report generator further comprises a
40 user interface for browsing other test data for a user.

41 468. The system of Claim 463, wherein the data report generator further comprises
42 means for determining the number of user test results shown.

43 469. The system of Claim 463, wherein the data report generator further comprises
44 means for permitting the user to select a data report print format.

45   470.   The system of Claim 463, wherein the data report generator further comprises

46   means for permitting the user to select a data report display format.

47   471.   The system of Claim 463, wherein the data report generator further comprises

48   means for generating a data report for one or more students in a class, means for generating a

49   data report for one or more classes each having one or more students and means for generating a

50   data report for a school having one or more classes.

51   472.   The system of Claim 435, wherein the teacher station further comprises means for

52   communicating the response for each test for each student back to the server computer.

53   473.   The system of Claim 472, wherein the teacher station further comprises means for

54   detecting a break in the communication between the teacher station and the server computer and

55   means for resending any test data that was not sent due to the communications break.

56   474.   The system of Claim 435, wherein each student computer further comprises

57   means for connecting to the server computer and means for downloading the resources necessary

58   to execute the current test when the test is started.

59   475.   The system of Claim 435, wherein the teacher station further comprises means for

60   generating a classroom layout showing an icon for each student computer.

61   476.   The system of Claim 475, wherein the teacher station further comprises means for

62   monitoring each student's test progress and controlling each student computer.

63   477.   The system of Claim 475, wherein the teacher station further comprises means for

64   collecting student test data.

65   478.   The system of Claim 475, wherein generating the layout further comprises means

66   for coloring each icon depending on the state of testing for the particular student computer.

67   479.   The system of Claim 435, wherein the teacher station further comprises means for

68   generating one or more separate accounts for the diagnostic system, wherein the accounts include

69   an account manager for managing an entire school or district of users of the diagnostic system, a

70   lead teacher for managing the use of the diagnostic system by one or more classroom teachers in

71   a particular school and one or more classroom teachers who each administer the diagnostic

72   testing for a particular class of students.

73   480.   The system of Claim 479, wherein the teacher station further comprises means for

74   the account manager to register one or more lead teachers and means for each lead teacher to

75   register one or more classroom teachers who administer the test.

76   481.   The system of Claim 480, wherein the account manager has access to testing data

77   for the entire district, wherein the lead teacher has access to testing data for the entire school and

78   each classroom teacher has access to testing data for the class of the classroom teacher.